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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/563,999	01/09/2006	Volker Ploetz	INA-PT167(4240-18-US)	7053
3624 7590 09/21/2007 VOLPE AND KOENIG, P.C. UNITED PLAZA, SUITE 1600 30 SOUTH 17TH STREET PHILADELPHIA, PA 19103			EXAMINER LEWIS, TISHA D	
			ART UNIT 3681	PAPER NUMBER
			MAIL DATE 09/21/2007	DELIVERY MODE PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

## Office Action Summary

Application No.

10/563,999

Applicant(s)

PLOETZ ET AL.

Examiner

TISHA D. LEWIS

Art Unit

3681

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
**Period for Reply**

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☐ Responsive to communication(s) filed on \_\_\_\_.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-6 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-6 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 09 January 2006 is/are: a) ☐ accepted or b) ☒ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some \* c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☒ Information Disclosure Statement(s) (PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_.
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date. \_\_\_\_.
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: \_\_\_\_.

### **DETAILED ACTION**

The following is a first action on the merits of application serial no. 10/563,999 filed on January 9, 2006.

#### ***Priority***

Receipt is acknowledged of papers submitted under 35 U.S.C. 119(a)-(d), which papers have been placed of record in the file.

#### ***Information Disclosure Statement***

The information disclosure statement filed January 9, 2006 has been considered.

#### ***Drawings***

Figure 1 should be designated by a legend such as --Prior Art-- because only that which is old is illustrated. See MPEP § 608.02(g). Corrected drawings in compliance with 37 CFR 1.121(d) are required in reply to the Office action to avoid abandonment of the application. The replacement sheet(s) should be labeled "Replacement Sheet" in the page header (as per 37 CFR 1.84(c)) so as not to obstruct any portion of the drawing figures. If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

#### ***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the

invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1-3, 5 and 6 are rejected under 35 U.S.C. 103(a) as being unpatentable over DE 19902565 in view of Faass et al 5, 795, 258, Dziedzic et al 6,443,846 and Precision steel warehouse and Brown metals company specifications. DE discloses a planet gear arrangement with a thrust washer (5) positioned on planet gear pins (3) fixed to a carrier (4) so that the washer contact both sides of the gears which are mounted on the pins through rolling bearings (2), the pin is provided with an axial lubricant through hole (3a) and a radial lubricant through hole (3b) branching off from the axial hole and the thrust washer can be provided with circumferential grooves for lubricant supply. DE doesn't disclose the washer having axial through holes or discloses the material and/or dimensions used to form the washer.

Faass et al discloses a planet gear arrangement having a thrust washer (26) arranged with a positioning bore (16) on planet pins (32) fixed to a carrier so that the washer contact both sides of the gears which are mounted on the pins through rolling bearings (34). The washer is provided with additional holes (44) which are uniformly spaced apart from each other in a peripheral direction and expand outwardly in a radial direction. The washer has an outer diameter that lies below a root circle of teeth of the planet gear (30).

Dziedzic et al discloses a spring element that is made from a tempered steel C75s (sae 1074) having a surface hardness of 48 to 53 Rc (equivalent to 400 to 570 HV) which lies between 370 to 580 HV (column 4, lines 40-44). Dziedzic et al shows that it is well known in the art to use the claimed steel having the claimed hardness.

The precision steel warehouse and Brown company specifications shows that it is well known in the art to universally use carbon strip steel having a thickness of 0.001 inches (equivalent to 0.03 mm).

It would have been obvious to a person of ordinary skill in the art at the time the invention was made to provide DE with a through hole in the thrust washer in view of Faass et al to provide direct lubricant supply between the gear pin and the washer.

It would have been obvious to a person of ordinary skill in the art at the time the invention was made to provide the DE thrust washer with a C75s material having a hardness and thickness as claimed in view of Dziedzic and both specifications to provide accurate hardness and flatness as needed.

Claim 4 is rejected under 35 U.S.C. 103(a) as being unpatentable over DE in view of Faass et al, Dziedzic et al and both specifications as applied to claim 1 above, and further in view of applicant's specification page 1, line 30. DE in view of Faass et al, Dziedzic et al and both specifications disclose the thrust washer made of a material formed of cold rolled strip, but doesn't disclose if the washer is subjected to grinding.

Applicant's background of the prior art discloses that washers are usually stamped and then surface grounded.

It would have been obvious to a person of ordinary skill in the art at the time the invention was made to provide the washer of DE in view of Faass et al, Dziedzic et al and both specifications with a grinding process in view of applicant's admitted prior art to provide friction surface quality.

***Conclusion***

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

-Fugel 7,189, 183, Thompson 6,511,226 and Eberle technical information catalog.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to TISHA D. LEWIS whose telephone number is 571-272-7093. The examiner can normally be reached on M-F 7:30 AM TO 4:00 PM.


If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, CHARLES A. MARMOR can be reached on 571-272-7095. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

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Tdl  
September 16, 2007

  
TISHA LEWIS  
PRIMARY EXAMINER  
AU 3681 9/16/07